

AB-1244 Mast Erection Procedure

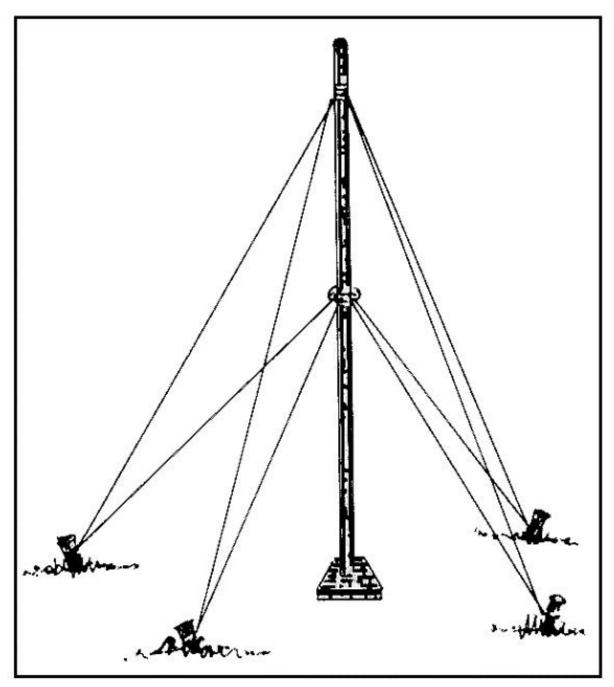


Figure 3-22. Erected mast assembly, less antenna.

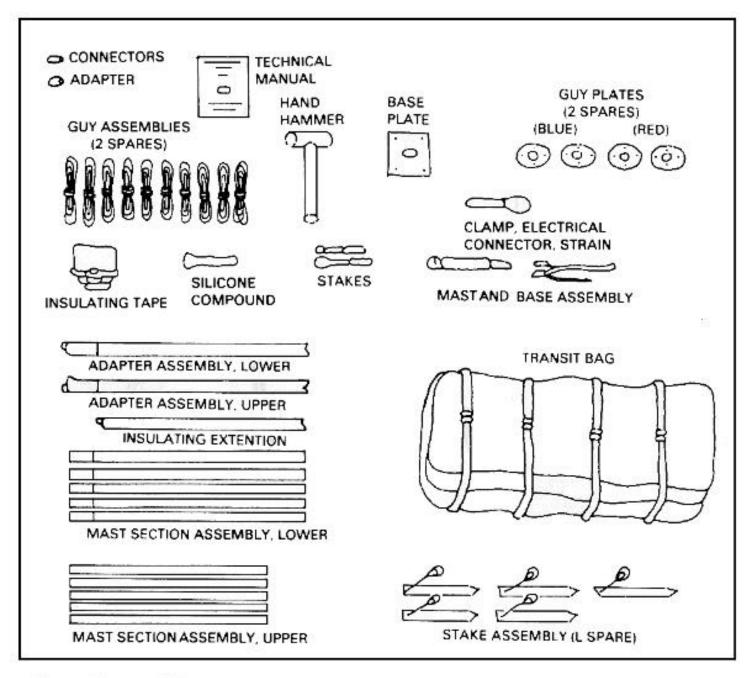


Figure 3-21. OE-303 antenna mast assembly (AB-1244()/GRC).

STEP ACTION

- Site layout.
 - Position the base plate, with the ribs up, where the antenna is to be erected.
 - b. Drive the stake of the mast and base assembly (Figures 3-3 and 3-4) through the center hole of the base plate with the hammer.

CAUTION

Use extreme care in driving the stake with the hammer. The space between the ears of the stake is barely enough to clear the hammer. Hitting one of the ears with the hammer will break it.

- Drive the two pin stakes through opposite corner holes of the base plate.
- d. Assemble the five lower mast sections on the mast and base assembly.
- Slide the lower guy plate (color coded blue) onto the male end of the lower adapter assembly and join it to the mast.
- Assemble three upper mast sections on the lower adapter assembly.
- g. Walk the assembled mast around the mast and base assembly. Drive the guy stakes as shown in Figures 3-3 and 3-4.

NOTE: Make sure the area for the anchors is firm. If the ground is marshy or sandy, get specific instructions from your supervisor on how to reinforce the anchors.

 Return the mast and base assembly to the alignment shown in Figure 3-3.

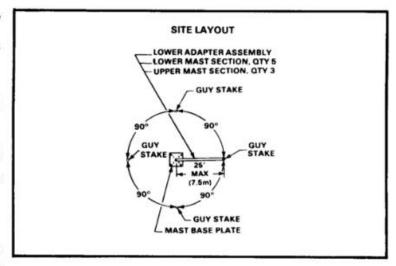


Figure 3-3. Positioning guy stakes.

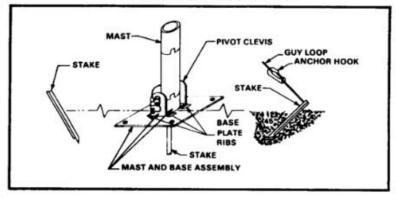


Figure 3-4. Ground anchor/pivot clevis alignment.

ACTION

- 2 Assemble the mast.
 - Assemble the two remaining upper mast sections on the nine previously assembled.

NOTE: If the antenna is not to be raised to its full height, reduce the number of mast sections. Eliminate the upper mast sections first. The lower and upper adapter assemblies and the insulating extension must be used.

- Slide the upper guy plate (color coded red) onto the male end of the upper adapter assembly and join it to the mast.
- c. Turn the guy plates so that one hole of each is uppermost.
- 3 Connect the guys.
 - Attach the hooks of the lower guy assemblies (color coded blue) to the lower guy plate (Figure 3-5).
 - Extend the guy assemblies to the side and back anchor hooks and attach the guy loops (Figure 3-6).
 - Attach the hooks of the upper guy assemblies (color coded red) to the upper guy plate (Figure 3-5).
 - d. Extend the upper guy assemblies to the side and back anchor hooks and attach the guy loops (Figure 3-6).
 - e. Make sure that the mast assembly is laid out straight and crosses beside one guy stake (the back guy stake, Figure 3-14).
 - f. Pull the upper and lower guys on each side tight (Figure 3-7) and secure them (Figure 3-8). Make sure the mast assembly is not pulled out of line.
 - g. Lay the two bottom (upper and lower) guys along one of the tightened side guys and adjust them to the same length. Attach the bottom guy ropes to the back guy stake (Figure 3-14).

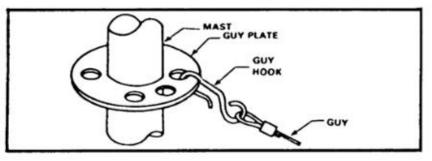


Figure 3-5. Attaching guy hooks to guy plate.

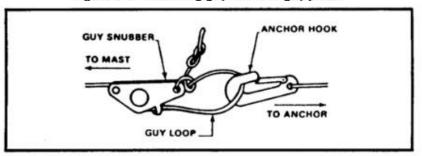
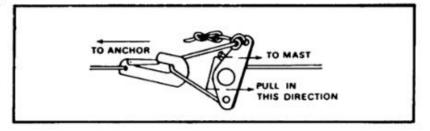


Figure 3-6. Attaching guy loops to ground anchor.



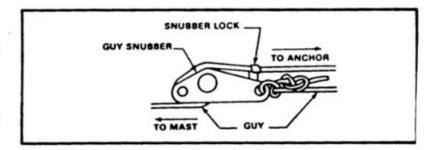


Figure 3-8. Securing guy with snubber lock.

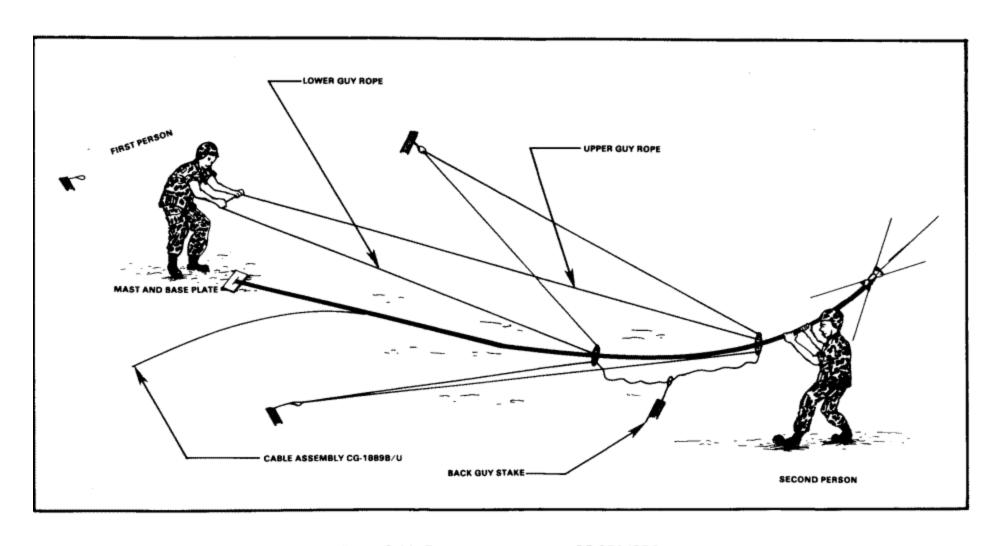


Figure 3-14. Erecting antenna group OE-254/GRC.

6 Erect the antenna.

WARNING 1

When erecting the antenna, allow only team personnel in the erecting area.

WARNING 2

Clearly mark all guys with warning flags or signs (supplied by your unit). In an emergency, use strips of white cloth as warning streamers.

- a. Preparation.
 - Installer—near the baseplate assembly in line with the far guy stake holding the free guys (Figure 3-14).
 - (2) Assistant—at the top holding the antenna at shoulder height.
- b. Raising.
 - (1) Installer—bow the top end by pulling the guys tight and walk backward pulling the mast slowly and firmly erect.
 - (2) Assistant—walk toward the base pushing the mast upward.
- c. Adjusting.
 - Connect the free guys to the remaining guy stake assembly (Figure 3-6) and tighten the guys.
 - (2) Adjust all the guy ropes evenly. Check for vertical position by comparing the mast with a building, pole, or other vertical object.

NOTE: Leave a slight slack in each guy to allow for expansion and contraction of the mast and guys. Check the tension in the morning and during the day. Experience with temperature conditions in the area will determine how tight the guys should be.

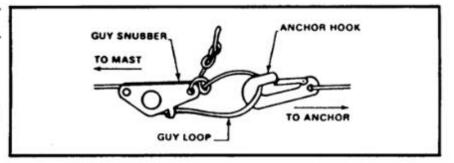


Figure 3-6. Attaching guy loops to ground anchor.